

Type Specimens of the Insect Order Odonata in the Collection of the National Museums of Kenya

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Abstract. A list of Odonata type specimens held at the Invertebrates Section of the Zoological Department of the National Museums of Kenya is presented. The Odonata collection houses 195 paratype specimens in 25 species. It lacks Odonata holotypes. The paratype specimens date between 1891 and early 1960's. The species are sorted alphabetically under their family. Reference to the original descriptions is given. The localities, geo-reference data, name of collector(s), and the date collected are also provided.

Key words. Type specimens, Odonata, NMK Nairobi

INTRODUCTION

The majority of the Eastern African dragonflies belongs to species that are fairly widespread all over sub-Saharan Africa. Some range into Europe, Western Asia or even further (Clausnitzer and Dijkstra 2006; Suhling & Martens 2007). The African Odonata number around 850 species that are placed in 125 genera (Dijkstra 2007). The African Odonata, therefore, represent about 15% of the world's total species. The Eastern Africa check-list mentions around 470 Odonata species (Clausnitzer & Dijkstra 2006).

The Afrotropical odonatology is built on the work of Elliot C.G. Pinhey (Vick et al. 2001). Pinhey's "Survey of the dragonflies of Eastern Africa" (Pinhey 1961) was the first and up to now the only comprehensive review of the Eastern Africa fauna, though a key embracing the entire region will be published in near future (Clausnitzer & Dijkstra in preparation).

Pinhey's legacy provides the main information on the taxonomy and ecology of African Odonata and the NMK Odonata collection at Nairobi, Kenya. The NMK collection covers regions comprising Kenya, Uganda, Tanzania, Ethiopia, Malawi, Zimbabwe, Democratic Republic of Congo, Central African Republic and the Republic of South Africa.

The Zoology Department of the National Museums of Kenya (NMK) houses 195 type specimens of Odonata, representing 25 species in seven families. All type specimens are paratypes, although one of them is labelled cotype. The majority of the holotypes are kept at the collector's or determinant's museums, most of which are outside Africa. Depositing of specimens in international museums is vital in taxonomic studies since it allows critical reviews of the type materials. A good example is *Azuragrion (Enallagma) vansomeri* (May, 2002).

Despite the fact that the African Odonata diversity is relatively well-known, there is a severe shortage of African

odonatologists to upgrade taxonomic issues on the continent (Dijkstra 2007). Many of the Eastern African countries do not have Odonata taxonomists. This creates a challenge for the African governments, international taxonomic groups and scientific institutions to come with a solution.

This publication of the NMK Odonata type specimens is grouped by families. The families and the species within families are listed alphabetically by specific or subspecific epithet, followed by the original generic assignment, author, year of original publication and page number of the description. If the current classification or the current generic assignment differs from the original name, the valid name is also given. Institutional depositories for holotypes that are not in NMK are indicated if traceable. All types are listed with full locality information. This information includes names and geo-references of the collection sites, surname and initials of the collector(s), and the dates of collection. If not otherwise mentioned, the geo-references are approximations taken from the ADL Gazetteer (2009). Locality information for paratype specimens collected at the same locality and date by different collectors or collected by the same collector in the same locality but at different dates is pooled.

ODONATA

Aeshinidae

sevastopuloi, *Acanthagyna sevastopuloi* Pinhey, 1961: 100
Holotype ♂ in BMNH
Current classification: Synonym of *Gynacantha nigeriensis* (Gambles, 1956)

1 PT: Uganda. Bwamba Forest, 0°50'N, 30°03'E, E. Pinhey

ukerewensis, *Heliaeschna ukerewensis* Pinhey, 1961: 103
Holotype ♂ in BMNH

Current classification: Synonym of *Heliaeschna trinervulata* Fraser, 1955

1 PT: Tanzania: Tang. Terr., Ukerewe Island, 2°03'S, 33°0'E, Father Conrad

victoriae, *Acanthagyra victoriae* Pinhey, 1961: 101

Holotype ♂ in BMNH

Current classification: Synonym of *Gynacantha bullata* Karsch, 1891

1 PT: Uganda: Katera Sango Bay, 0°51'S, 31°42'E, T.H.E. Jackson

2 PT: Uganda: Katera, 0°42'N, 32°00'E, T.H.E. Jackson

3 PT: Uganda: Entebbe, 0°04'N, 32°28'E, Sevastopulo, 4.i.1953, T.H.E. Jackson, E. Pinhey

Chlorocyphidae

greenwayi, *Platycypha greenwayi* Pinhey, 1950: 18–22
Holotype ♂ in BMNH

Current classification: Synonym of *Platycypha auripes* (Förster, 1906)

5 PT ♀, 19 PT ♂: Tanzania: Amani, E. Usambara, T.T., 4°45'S, 38°30'E, E. Pinhey, iii.1950

jacksoni, *Chlorocypha jacksoni* Pinhey, 1952: 13

Holotype ♂ in BMNH

3 PT ♀: Uganda: Mafuga Rainforce, Kigezi, 1°03'S, 29°52'E, T.H.E. Jackson

3 PT ♀: Uganda: Kigezi Rutega, 0°16'N, 31°37'E, T.H.E. Jackson

picta, *Chlorocypha picta* Pinhey, 1962: 30

Current classification: *Platycypha picta* (Pinhey, 1962)
Holotype ♂ in NMBZ

2 PT: Congo: Etoumbi Forest, Makoua, Moyen, 0°00.414'N, 15°38'E, E. Pinhey

Coenagrionidae

beadlei, *Pseudagrion beadlei* Pinhey, 1961: 33

Holotype ♂ in BMNH

1 CT, 4 PT, 1 PT ♀: Uganda: Jinja, 0°23'N, 32°33'E, E. Pinhey

2 PT: Kenya: Karungu Island, Lake Victoria, 0°10'S, 34°36'E, E. Pinhey

chomae, *Pseudagrion chomae* Pinhey, 1964: 86, 90

Holotype ♂ in Natural History Museum of Zimbabwe

Current classification: Synonym of *Pseudagrion massaicum* Sjöstedt, 1909

21 PT: Kenya: Nyanza Province, Rusinga Island, Lake Victoria, 0°24'S, 34°4'E, E. Pinhey, J. Leakey

4 PT: Uganda: Jinja, 0°23'N, 32°33'E, E. Pinhey

5 PT: Kenya: Rusinga, 0°01'N, 36°11'E, E. Pinhey, J. Leakey

4 PT: Uganda: Mt. Kalam, Karamoja, 2°45'N, 34°15'E, T.H.E. Jackson

rufocinctum, *Pseudagrion rufocinctum* Pinhey, 1956: 17–41

Holotype ♂ in BMNH

1 PT ♂: Uganda: Butolo Forest, Kampala, 0°19'N, 32°35'E, E. Pinhey

1 PT ♂: Uganda: Kamengo, 0°40'S, 31°28'E, E. Pinhey

rubroviridis, *Pseudagrion rubroviridis* Pinhey, 1956: 23

Holotype ♂ in BMNH

Current classification: Synonym of *Pseudagrion sudanicum* Le Roi, 1915

3 PT: Zambia: Victoria Falls, Livingstone, 17°51'S, 25°52'E, N.R., E. Pinhey

vansomereni, *Enallagma vansomereni* Pinhey, 1956: 26

Current classification: *Azuragrion vansomereni* (Pinhey, 1955)

Holotype ♂ in BMNH

2 PT: Uganda: Acholi, 3°48'N, 32°33'E, T.H.E. Jackson

whellani, *Pseudagrion whellani* Pinhey, 1956: 18

Holotypus ♂ in MNHN

Current classification: Synonym of *Pseudagrion hamoni* Fraser, 1955: 22

2 PT: Sudan: Yambio, 4°34'N, 28°25'E, C.E. Wilson

2 PT: Kenya: Nyanza Province, Rusinga Island, Lake Victoria, 0°24'S, 34°10'E, J. Leakey

3 PT: Kenya: Kaimosi Forest, Kakamega, 0°16'N, 34°53'E, E. Pinhey, 1.iii.1950

9 PT: Kenya: Rift Valley, Kacheliba suk., 1°29'N, 35°01'E, T.H.E. Jackson, E. Pinhey

4 PT: Kenya: Rift Valley, Magadi, 1°42'S, 36°12'E, J. Naegle

2 PT: Uganda: Acholi, 3°00'N, 32°30'E, T.H.E. Jackson, iv.1952

2 PT: Uganda: Aremo Lambwor, Hills Karamoja, 2°45'N, 34°15'E, T.H.E. Jackson

3 PT: Uganda: Bwamba Forest, Fort Portal, 0°40'N, 30°17'E, E. Pinhey

1 PT ♀: Uganda: Jinja, 23°00'N, 32°33'E, E. Pinhey

1 PT: Uganda: Kampala, 0°19'N, 32°35'E, E. Pinhey

4 PT: Uganda: Madi Opei, 3°37'N, 33°05'E, T.H.E. Jackson

6 PT: Nigeria: Ibadan, 7°26'N, 3°55'E, T.H.E. Jackson

3 PT: Zambia: N. Rhodesia, Victoria Falls, Livingstone, 17°51'S, 25°52'E, E. Pinhey

Corduliidae

junior, *Macromia kinminsi junior* Pinhey, 1961: 116

Holotype ♂ in BMNH

Current classification: Synonym of *Phyllomacromia kinminsi* (Fraser, 1954)

1 PT: Uganda: Tororo, 0°41'N, 34°11'E, T.H.E. Jackson

Gomphidae

butoloensis, *Notogomphus butoloensis* Fraser, 1952: 3

Holotype ♂ in BMNH

1 PT: Kenya: Rusinga Island, Lake Victoria, 0°24'S, 34°04'E, E. Pinhey

pinheyi, *Nepogomphoides pinheyi* Fraser, 1952: 3

Holotype ♂ in BMNH

Current classification: Synonym of *Nepogomphoides stuhlmanni* (Karsch, 1899)

9 PT: Tanzania: Kimboza Forest, Uluguru Mts, 7°10'S, 37°40'E, E. Pinhey, J. William

viridior, *Paragomphus viridior* Pinhey, 1961: 84

Holotype ♂ in BMNH

2 PT ♂: Kenya: Rift Valley, Kaimosi, 1°12'N, 34°57'E, van Someren; E. Pinhey, I.xi.1930

1 PT ♂: Kenya: Rift Valley, Kitale, 1°01'N, 35°00'E, van Someren

3 PT ♀, 1 PT ♂, 1 PT unknown gender: Kenya: Western, Kabras, 0°26'N, 34°48'E, E. Pinhey; van Someren

2 PT: Kenya: Broderick Falls, Kabras, 0°36'N, 34°48'E, E. Pinhey

1 PT ♂: Uganda: Bwamba Forest, 0°50'N, 30°03'E, E. Pinhey

Lestidae

pinheyi, *Lestes pinheyi* Fraser, 1955: 10

Holotype ♂ in BMNH

1 PT: Uganda: Aremo Lambwor, Hills Karamoja, 2°45'N, 34°15'E, T.H.E. Jackson

1 PT: Africa: Uganda: Acholi, 3°48'N, 32°33'E, T.H.E. Jackson

Libellulidae

anomala, *Trithemis anomala* Pinhey, 1955: 38

Holotype ♂ in BMNH

2 PT: Zambia: Lake Chila Abercon, 8°50'S, 31°23'E, D.V. Fitzgerald, 31.i.1954; E. Pinhey

bredoi, *Trithemis bredoi* Fraser, 1953: 252

Holotype ♂ in MRAC

2 PT: D.R. Congo: Ubangi Yakoma, 4°05'N, 22°27'E, H.J. Bredo

1 PT: D.R. Congo: Banzyville, 4°18'N, 21°11'E, H.J. Bredo

fitzgeraldi, *Orthetrum fitzgeraldi* Pinhey, 1955: 30

Current classification: *Nesciothemis fitzgeraldi* (Pinhey, 1955)

Holotype ♂ in BMNH

10 PT: Zambia: Lake Chila Abercon, 8°50'S, 31°23'E, D.V. Fitzgerald, 20.iii.1951; E. Pinhey; Mc Arthur

ikomae, *Zygonyx ikomae* Pinhey, 1960: 270

Holotype ♂ in Natural History Museum of Zimbabwe
Current classification: Synonym of *Zygonyx natalensis* (Martin, 1900)

2 PT: Uganda: Bwamba Forest, 0°50'N, 30°03'E, E. Pinhey

leakeyi, *Lokithemis leakeyi* Pinhey, 1955: 34

Current classification: *Porpacithemis leakeyi* (Pinhey, 1955)

Holotype ♂ in BMNH

2 PT: Zambia: Lake Chila Abercon, 8°50'S, 31°23'E, E. Pinhey; D.V. Fitzgerald, 7.xii.1952

parasticta, *Trithemis parasticta* Pinhey, 1955: 35

Holotype in BMNH

Current classification: Synonym of *Trithemis stictica* (Burmeister, 1839)

1 PT: Zambia: Lake Chila Abercon, 8°50'S, 31°23'E, E. Pinhey

pseudodeflecta, *Hadrothemis deflecta pseudodeflecta* Pinhey, 1961: 127

Holotype ♂ in BMNH

Current classification: Synonym of *Hadrothemis deflecta* (Karsch, 1891)

4 PT: Uganda: Entebbe, 0°04'N, 32°28'E, E. Pinhey

2 PT: Uganda: Katera, 0°55'N, 31°39'E, T.H.E. Jackson; E. Pinhey

1 PT: Uganda: Kamengo, 0°40'S, 31°28'E, T.H.E. Jackson

2 PT: Uganda: Mafuga Rainforce, Kigezi, 0°16'N, 31°37'E, T.H.E. Jackson

1 PT: Uganda: Labwor Hills, Karamoja, 2°45'N, 34°15'E, van Someren

5 PT: Uganda: Butolo Forest, Kampala, 0°19'N, 32°35'E, E. Pinhey

tropicana, *Trithemis tropicana* Fraser, 1953

Holotype ♂ in MRAC

Current classification: Synonym of *Trithemis africana* (Brauer, 1867)

2 PT: D.R. Congo: Eala, 0°04'N, 18°17'E, J. Ghesquiere, 8.i.1935

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